IN THE CLAIMS:

Claim 1 (currently amended): A bonding apparatus for semiconductor devices comprising a bonding head, which performs bonding work on an object of bonding, and a moving mechanism, which moves the bonding head to arbitrary positions, said moving mechanism comprising:

a first actuator for directly driving said bonding head, said first actuator comprised of a first movable member, which is movable along a first linear guide rotationally provided on a supporting stand, and a first drive section, which drives said first movable member, and

a second actuator for directly driving said bonding head, said second actuator comprised of a second movable member, which is movable along a second linear guide rotationally provided on [[a]] said supporting stand, and a second drive section, which drives said second movable member; and wherein

one end of the first movable member is fastened to the bonding head, and one end of the second movable member is shaft-supported by the bonding head.

Claim 2 (currently amended): A bonding apparatus according to Claim 1, wherein

the first actuator is structured so that the first drive section and the first linear guide that guides the first movable member are rotationally provided on the supporting stand as an integral unit, and

the second actuator is structured so that the second drive section and the second linear guide that guides the second movable member are rotationally provided on the supporting stand as an integral unit.

Claim 3 (currently amended): A bonding apparatus according to Claim 1, wherein

the first actuator is comprised of a first movable coil which is said first movable member, and said first drive section of the first actuator is fastened to the supporting stand and includes a first magnet that provides a magnetic flux linkage to the first movable coil, and

a size of the first movable coil is set based upon conditions in which an amount of magnetic flux linkage with said first magnet, which is applied to the first movable coil by rotational and linear movements of the first movable coil, is free of changing; and

the second actuator is comprised of a second movable coil which is said second movable member, and said second drive section of the second actuator is fastened to the

supporting stand and includes a second magnet that provides a magnetic flux linkage to the second movable coil, and

a size of the second movable coil is set based upon conditions in which an amount of magnetic flux linkage from said second magnet, which is applied to the second movable coil by rotational and linear movements of the second movable coil, is free of changing.

Claim 4 (currently amended): A bonding apparatus for semiconductor devices comprising a bonding head, which performs bonding work on an object of bonding, and a moving mechanism, which moves the bonding head to arbitrary positions, the moving mechanism comprising:

a first actuator ~~that includes~~ for directly driving said bonding head, said first actuator including:

a first movable coil, which constitutes a first movable member rotationally provided on a first slide stand that is movable along a first linear guide fastened to a supporting stand, and a first drive section, which includes a first magnet for providing a magnetic flux linkage to the first movable coil and is fastened to the supporting stand, wherein a size of the first movable coil is set based upon conditions in which an amount of magnetic flux linkage from said first magnet that is applied to the first movable coil by rotational and linear movements of the first movable coil is free of changing; and

a second actuator ~~that includes~~ for directly driving said bonding head, said second actuator including:

a second movable coil, which constitutes a second movable member rotationally provided on a second slide stand that is movable along a second linear guide fastened to [[a]] said supporting stand, and a second drive section, which includes a second magnet for providing a magnetic flux linkage to the second movable coil and is fastened to the supporting stand, wherein a size of the second movable coil is set based upon conditions in which an amount of magnetic flux linkage from said second magnet that is applied to the second movable coil by rotational and linear movements of the second movable coil is free of changing; and wherein

one end of the first movable member is fastened to the bonding head, and one end of the second movable member is shaft-supported by the bonding head.

Claim 5 (currently amended): A bonding apparatus according to any one of Claims 1 through 4, wherein a point where a first straight line and a second straight line intersect is set

on substantially the center of gravity of the bonding head, said first straight line connecting a center of rotation of the first movable member and a part of the first movable member at which the first movable member is connected to the bonding head, and said second straight line connecting a center of rotation of the second movable member and a part of the second movable member at which the second movable member is connected to the bonding head.[[.]]

Claim 6 (original): A bonding apparatus according to any one of Claims 1 through 4, wherein the bonding head is supported on the supporting stand by fluid pressure.

Claim 7 (original): A bonding apparatus according to any one of Claims 1 through 4, wherein the supporting stand is a fluid pressure supporting stand that supports the bonding head by fluid pressure.

Claim 8 (original): A bonding apparatus according to Claim 1 or 2, wherein the supporting stand is a suspension supporting stand that supports the bonding head by suspension.

Claim 9 (original): A bonding apparatus according to any one of Claims 1 through 4, wherein said bonding apparatus comprises:

a first sensor that detects a position of the first movable member,

a second sensor that detects a position of the second movable member,

a position calculating means that calculates a position of the bonding head as a position in an orthogonal coordinate system with respect to the supporting stand based upon detection data of the first sensor and detection data of the second sensor, and

a control means that performs position control of the bonding head based upon a calculated position in the orthogonal coordinate system.